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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/825,157	04/16/2004	Daniel W. King	KING3001/JEK/JJC	7842

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EXAMINER	
PETERSON, KENNETH E	
ART UNIT	**PAPER NUMBER**
3724	

DATE MAILED: 10/12/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

FNG

Office Action Summary	Application No.	Applicant(s)	
	10/825,157	KING ET AL	
	Examiner	Art Unit	
	Kenneth E. Peterson	3724	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *25 August 2005*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-11 and 13-17* is/are pending in the application.

4a) Of the above claim(s) *3-5,9-11,15* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,2,6-8,13,14,16 and 17* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

1. Newly submitted claim 15 is directed to an invention that is independent or distinct from the invention originally elected (group I). Claim 15 is drawn to a cutting head assembly having hub spokes, which is a subcombination usable together with the other subcombinations of groups I and II.

Since applicant has received an action on the merits for the originally elected invention, claim 15 is withdrawn from consideration as being directed to a non-elected invention. See 37 CFR 1.142(b) and MPEP § 821.03.

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 6,8 and 13 are rejected under 35 U.S.C. 102(b) as being anticipated by Kress et al.'680, who shows;

A mounting ring (24) having axially depending protrusions (26) with tapered surfaces (figures 8,10). The protrusion has a convex corner.

A support ring (39) having radially inwardly projecting flanges (40) with matching tapered surfaces (figures 8,10).

The device is usable in a number of different orientations, so either of the sides could be considered "upper" or "lower".

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

5. Claims 6-8,13,16 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hull '679, who shows a mounting ring (5) having axially depending protrusion (8) with tapered surfaces (figure 5) and a support ring (6) having radially outwardly projecting flanges (10) with matching tapered surfaces (figure 5).

Hull's protrusions project upwardly rather than downwardly. However, which ring has the protrusions and which ring has the flanges is irrelevant to the functioning of the device. It would have been obvious to one of ordinary skill in the art to have made a reversal of parts and had the top ring have the axially depending protrusions and the bottom ring have the radially outwardly extending flanges, since the operation of the device would not thereby be modified. See in re Japikse, 86 USPQ 70.

Also, Hull locks upon rotation in both directions, rather than in just one direction. Examiner notes that Hull's tool is described as being uni-directional ("a circumferential direction", line 40, column 1). In the art of uni-directional tool driving, Examiner takes Official Notice that it is a well known alternative for the inclined coupling to lock in just one direction. An example of this is the patent to Kress et al.'680 (see figures 8,10). It would have been obvious to one of ordinary skill in the art to have modified Hull by having the incline on just one side, as is well known and taught by Kress, since this is an art-recognized equivalent known for the same purpose. See MPEP 2144.06.

6. Claims 1,2,6-8,13,14,16 and 17 are rejected under 35 U.S.C. 103(a).

Examiner takes Official Notice that there are numerous cutting machines that employ impellers and a ring locking system. An example of this type of machine is the patent to Jacko et al. '824.

Examiner takes Official Notice that it is well known for tool's such as these to employ a ring locking system having one ring with axial protrusions having tapered surfaces and the other ring having radially outwardly projecting flanges with matching tapered surfaces. An example of this is the patent to Hull '679, as mentioned above. It would have been obvious to one of ordinary skill in the art to have modified a known cutting machine having a ring locking system, such as Jacko, by providing the rings with mating tapered axial protrusions and tapered radial flanges, as is well known and taught by Hull, in order to be able to easily connect and disconnect the rings for repair, replacement or maintenance.

Also, Hull locks upon rotation in both directions, rather than in just one direction. Examiner notes that Hull's tool is described as being uni-directional ("a circumferential direction", line 40, column 1). In the art of uni-directional tool driving, Examiner takes Official Notice that it is a well known alternative for the inclined coupling to lock in just one direction. An example of this is the patent to Kress et al.'680 (see figures 8 10), which shows a 2nd surface on the protrusions and flanges that is "generally parallel to the support ring axis". It would have been obvious to one of ordinary skill in the art to have modified Hull by having the inline on just one side, as is well known and taught by

Kress, since this is an art-recognized equivalent known for the same purpose. See MPEP 2144.06.

7. Applicant's arguments have been fully considered but they are not persuasive.

Applicant has overcome the objections to the claims.

Applicant argues that Kress does not have interlocking inclined surfaces. Examiner does not understand why Applicant is making this argument, since Kress clearly shows this feature in figures 8 and 10. The flanges and protrusions of Kress may look different than Applicant's, but they have *the same inclined surfaces*.

Applicant has overcome the 102b rejection by Hull.

Applicant argues against the 103 rejection by Hull, stating that it would not have been obvious to reverse the flange and protrusion, because food would become built-up. This argument is not found to be persuasive because regardless of orientation at least one of the flange and protrusion has an upwardly facing inclined surface that could catch food, and therefor one orientation is not more disadvantageous than another. Furthermore, Hull doesn't necessarily spin food in his bucket.

Applicant argues against the Jacko-Hull rejection. The argument that Applicant's device is lockable in only one direction is noted, but this "removal of a feature" certainly doesn't warrant a patent, especially in light of Kress and many others doing it that way.

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP

§ 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ken Peterson whose telephone number is 571-272-4512. The examiner can normally be reached on Mon-Thur, 7:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Allan Shoap can be reached on 571-272-4514. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

kp
October 6, 2005

KENNETH E. PETERSON
PRIMARY EXAMINER